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APPLICATION NO. FILING DATE		FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
09/539,405		03/31/2000	Ioan V. Teodorescu	036560.6701	9485	
24587	7590	04/19/2004		EXAMINER		
ALCATEL	USA		KADING, JOSHUA A			
		ROPERTY DEPART	ART UNIT	PAPER NUMBER		
PLANO, T		RKWAY, MS LEGI	2661			
FLANO, 12	A 15015			2001	3	
			DATE MAILED: 04/19/2004			

Please find below and/or attached an Office communication concerning this application or proceeding.

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Office Action Summary		Applicat	ion No.	Applicant(s)			
		09/539,4	105	TEODORESCU, IOAN V.			
		Examine	r	Art Unit			
		Joshua I		2661			
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply							
THE N - Exten after S - If the - If NO - Failur Any re	ORTENED STATUTORY PERIOD FORMALING DATE OF THIS COMMUNI sions of time may be available under the provisions of time for the provisions of time for reply specified above is less than thirty (3 period for reply is specified above, the maximum state to reply within the set or extended period for reply eply received by the Office later than three months and patent term adjustment. See 37 CFR 1.704(b).	CATION. of 37 CFR 1.136(a). In no e- nunication. b) days, a reply within the sta statutory period will apply and v will, by statute, cause the ap	vent, however, may a reply be time stutory minimum of thirty (30) days will expire SIX (6) MONTHS from plication to become ABANDONE	nety filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).			
Status							
1) 🗌	Responsive to communication(s) file	d on					
2a) <u></u> □	This action is FINAL . 2b)⊠ This action is non-final.						
3) 🗌	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
	closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims							
5)□ 6)⊠ 7)□	 Claim(s) 1-22 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration. Claim(s) is/are allowed. Claim(s) 1-22 is/are rejected. Claim(s) is/are objected to. Claim(s) are subject to restriction and/or election requirement. 						
Application	on Papers						
10)⊠	The specification is objected to by the The drawing(s) filed on 31 March 200 Applicant may not request that any object Replacement drawing sheet(s) including The oath or declaration is objected to	<u>00</u> is/are: a)⊠ acce ction to the drawing(s) the correction is requi	be held in abeyance. See ired if the drawing(s) is obj	e 37 CFR 1.85(a). jected to. See 37 CFR 1.121(d).			
Priority u	nder 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received.							
	e of References Cited (PTO-892)		4) Interview Summary				
3) 🛛 Inform	e of Draftsperson's Patent Drawing Review (P nation Disclosure Statement(s) (PTO-1449 or · No(s)/Mail Date <u>3, 4</u> .		Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	ate Patent Application (PTO-152)			

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DETAILED ACTION

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

10 Claims 1 and 9-11 are rejected under 35 U.S.C. 102(b) as being anticipated by Cordell (U.S. Patent 5,367,520).

Regarding claim 1, Cordell discloses "a system for providing a feedback signal in a telecommunications network, comprising:

a plurality of bus control modules operable to generate a feedback signal (figure 9, where elements 93 act as bus control modules in that the can handle a plurality of input and output lines and the CRD acts as the control module to generate the feedback signal);

a lower level distribution module coupled to the bus control modules, the lower level distribution module operable to receive the feedback signal and to insert feedback information for the lower level distribution module into the feedback signal (figure 9, elements 92 are the lower level distribution modules and insert their own feedback information into the signal as "WIN/LOSE" information); and

a timing generator coupled to the lower level distribution module, the timing generator operable to receive the feedback signal and to provide the feedback signal to

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a controller for response (figure 9, element 91 acts as the generic timing generator and sends the feedback signal to the Path Controller, element 95)."

Regarding claim 9, Cordell discloses "the system of claim 1, the feedback signal comprising an alarm signal (col. 16, lines 32-48 where the "back-pressure" is an alarm signal)."

Regarding claim 10, Cordell discloses "a method for providing a feedback signal in a telecommunications network, comprising:

generating a feedback signal with a plurality of bus control modules (figure 9, where elements 93 act as bus control modules in that the can handle a plurality of input and output lines and the CRD acts as the control module to generate the feedback signal);

providing the feedback signal from the plurality of bus control modules to a lower level distribution module (figure 9, where elements 92 clearly receive the feedback information from the bus modules);

inserting feedback information for the lower level distribution module into the feedback signal (figure 9, elements 92 are the lower level distribution modules and insert their own feedback information into the signal as "WIN/LOSE" information); and

providing the feedback signal from the lower level distribution module to a controller (figure 9, element 91 provides the feedback signal to the Path Controller, element 95)."

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Regarding claim 11, Cordell discloses "the method of claim 10, further comprising responding to the feedback signal with the controller (col. 22, lines 21-30 describes the operation of the path controller and it is clearly implied that the feedback signal received in figure 9 is used in the response of the controller)."

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

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Claims 3, 5, 12, 14, and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cordell.

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Regarding claims 3 and 12, Cordell discloses the system of claim 1 and method of claim 10. However, Cordell lacks "an intermediate level distribution module coupled to the lower level distribution module and to the timing generator, the intermediate level distribution module operable to receive the feedback signal and to insert feedback information for the intermediate level distribution module into the feedback signal."

Although Cordell lacks the intermediate level distribution module, it would have been obvious to one with ordinary skill in the art to include the intermediate level module. The

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motivation being that Cordell already discloses modules that perform the same functions as the intermediate module of claims 3 and 12 (see claims 1 and 10), and to add an additional module is a matter of design choice. That is to say adding an intermediate module to the system does not change the function of the individual modules or the system. So adding an intermediate module does not significantly improve upon the invention because it is not adding anything new. It is simply adding another module that functions the same as the other modules.

Regarding claims 5 and 14, Cordell discloses the system of claim 3 and method of claim 12. However, Cordell lacks "an upper level distribution module coupled to the intermediate level distribution module and to the timing generator, the upper level distribution module operable to receive the feedback signal and to insert feedback information for the upper level distribution module into the feedback signal." Although Cordell lacks the upper level distribution module, it would have been obvious to one with ordinary skill in the art to include the upper level module. The motivation being that Cordell already discloses modules that perform the same functions as the upper module of claims 5 and 14 (see claims 1 and 10), and to add an additional module is a matter of design choice. That is to say adding an upper module to the system does not change the function of the individual modules or the system. So adding an upper module does not significantly improve upon the invention because it is not adding anything new. It is simply adding another module that functions the same as the other modules.

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Regarding claim 16, Cordell discloses the method of claim 14. However, Cordell lacks "providing the feedback signal from the upper level distribution module to the controller." Although Cordell explicitly lacks transmitting the feedback signal from the upper level to the controller, Cordell does disclose the feedback signal being sent from other modules at different levels to the controller (see claim 1). And since the modules all operate in functionally the same way, it would have been obvious to one with ordinary skill in the art at the time of invention to have the feedback signal sent from the upper level to the controller. The motivation being that if the upper level is the last module before the controller, it must transmit the feedback signal to the controller.

Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Cordell in view of Diaz et al. (U.S. Patent 5,526,349).

Regarding claim 2, Cordell discloses the system of claim 1. However, Cordell lacks what Diaz discloses, that is "a plurality of cards coupled to each bus control module, each card operable to provide feedback information to the bus control module, the bus control module operable to generate the feedback signal based on the feedback information from the cards (figure 2, elements 44 are the cards coupled to the bus control modules; col. 2, lines 57-60 where figure 2 is represents the chassis for the switch of Cordell in figure 9)."

It would have been obvious to one with ordinary skill in the art at the time of invention to include the plurality of cards with the system of claim 1 for the purpose of connecting the switch to subscribers (Diaz, col. 11, lines 16-19). The motivation for this

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being that there needs to be a way to connect the switch to subscribers and vice versa; the cards a way to do this.

Claims 4, 6-8, 13, 15, and 17-22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cordell in view of Lau et al. (U.S. Patent 6,009,468).

Regarding claims 4 and 13, Cordell discloses the system of claim 3 and the method of claim 12. However, Cordell lacks what Lau discloses, that is "the feedback signal comprising a plurality of frames, the intermediate level distribution module corresponding to a specified frame, inserting the feedback information into the feedback signal comprising inserting the feedback information into the specified frame of the feedback signal (figures 1 and 2 where the NT modules collision feedback are placed in the feedback signal 20 in their respective slots)." It would have been obvious to one with ordinary skill in the art at the time of invention to include the frames with the system of claim 3 and the method of claim 12 for the purpose of transmitting feedback data about a plurality of different modules all at once (Lau, col. 4, lines 31-53). The motivation being that by transmitting all the feedback at once, each module can monitor the entire systems congestion.

Regarding claims 6 and 15, Cordell discloses the system of claim 5 and the method of claim 14. However, Cordell lacks what Lau discloses, that is "the feedback signal comprising a plurality of frames, the upper level distribution module

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corresponding to a specified frame, inserting the feedback information into the feedback signal comprising inserting the feedback information into the specified frame of the feedback signal (figures 1 and 2 where the NT modules collision feedback are placed in the feedback signal 20 in their respective slots)." It would have been obvious to one with ordinary skill in the art at the time of invention to include the frames with the system of claim 5 and the method of claim 14 for the purpose of transmitting feedback data about a plurality of different modules all at once (Lau, col. 4, lines 31-53). The motivation being that by transmitting all the feedback at once, each module can monitor the entire systems congestion.

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Regarding claims 7 and 17, Cordell discloses the system of claim 1 and the method of claim 10. However, Cordell lacks what Lau discloses, that is "the feedback signal comprising a plurality of frames, each bus control module corresponding to a specified frame, generating the feedback signal with the bus control modules comprising generating the specified frame of the feedback signal at the corresponding bus control module (figures 1 and 2 where the NT modules collision feedback are placed in the feedback signal 20 in their respective slots)." It would have been obvious to one with ordinary skill in the art at the time of invention to include the frames with the system of claim 1 and the method of claim 10 for the purpose of transmitting feedback data about a plurality of different modules all at once (Lau, col. 4, lines 31-53). The motivation being that by transmitting all the feedback at once, each module can monitor the entire systems congestion.

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Regarding claims 8 and 18, Cordell discloses the system of claim 1 and the method of claim 10. However, Cordell lacks what Lau discloses, that is "the feedback signal comprising a plurality of frames, the lower level distribution module corresponding to a specified frame, inserting the feedback information into the feedback signal comprising inserting the feedback information into the specified frame of the feedback signal (figures 1 and 2 where the NT modules collision feedback are placed in the feedback signal 20 in their respective slots)." It would have been obvious to one with ordinary skill in the art at the time of invention to include the frames with the system of claim 1 and the method of claim 10 for the purpose of transmitting feedback data about a plurality of different modules all at once (Lau, col. 4, lines 31-53). The motivation being that by transmitting all the feedback at once, each module can monitor the entire systems congestion.

Regarding claim 19, Cordell discloses "a method for providing a feedback signal in a telecommunications network, comprising:

providing a feedback signal (figure 9, where elements 93 provide the feedback signal)..."

However, Cordell lacks what Lau discloses, that is the feedback signal "comprising a plurality of frames (figures 1 and 2 where the NT modules collision feedback are placed in the feedback signal 20 in their respective slots)... assigning each of a plurality of modules to a specified frame of the feedback signal (figure 2 where each

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module is in one frame slot); and modifying the specified frame with the assigned module (figure 2, it is implied that the frame slot is modified by placing the collision feedback into it)."

It would have been obvious to one with ordinary skill in the art at the time of invention to include the frames with the rest of the method for the purpose of transmitting feedback data about a plurality of different modules all at once (Lau, col. 4, lines 31-53). The motivation being that by transmitting all the feedback at once, each module can monitor the entire systems congestion.

Regarding claim 20, Cordell and Lau disclose the method of claim 19. However, Cordell lacks what Lau further discloses, that is "modifying the specified frame with the assigned module comprising inserting feedback information for the assigned module into the specified frame (figure 2, it is implied that the frame slot is modified by placing the collision feedback into it)." It would have been obvious to one with ordinary skill in the art at the time of invention to include the inserting feedback information of the assigned module with the method of claim 19 for the same reasons and motivation as in claim 19.

Regarding claim 21, Cordell and Lau disclose the method of claim 19. However,

Lau lacks what Cordell further discloses, that is "providing the modified feedback signal
to a timing generator (figure 9, element 91 acts as the generic timing generator and
sends the feedback signal to the Path Controller, element 95); and responding to the

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modified feedback signal with the timing generator (figure 9, whereby sending a signal to the controller is the generator responding to the feedback)." It would have been obvious to one with ordinary skill in the art at the time of invention to include the timing generator and response with the method of claim 19 for the same reasons and motivation as in claim 19.

Regarding claim 22, Cordell and Lau disclose the method of claim 19. However, Lau lacks what Cordell further discloses, that is "the plurality of modules comprising bus control modules and distribution modules (figure 9, where elements 93 act as bus control modules in that the can handle a plurality of input and output lines and the CRD acts as the control module to generate the feedback signal and elements 92 act as distribution modules)." It would have been obvious to one with ordinary skill in the art at the time of invention to include the modules with the method of claim 19 for the same reasons and motivation as in claim 19.

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Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Baxter et al. (U.S. Patent 4,389,720) shows a telecommunication system with bus interfaces (modules) and timers. McGrew (U.S. Patent 6,717,940 B1) shows an SCP and SSP related telecommunication system with different levels, including a line card, distribution, and clock.

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joshua Kading whose telephone number is (703) 305-0342. The examiner can normally be reached on M-F: 8:30AM-5PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Douglas Olms can be reached on (703) 305-4703. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Business Center (EBC) at 866-217-9197 (toll-free).

Joshua Kading Examiner

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April 14, 2004